

AMENDMENT TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1-35. (Cancelled)

36. (Currently Amended) A cell ~~or tissue~~ collection medium, allowing morphological analysis and quantitation of RNA, DNA or proteins in a cellular sample ~~both cytological and molecular methods of analysis of cells or tissues collected therein, wherein the molecular method of analysis comprises either RNA or DNA or protein analysis or the analysis of both RNA and DNA, and wherein~~ the medium is being water based and comprises comprising an alcohol, a cross-linking agent and an anti-degradation agent, ~~and wherein~~ the cross-linking agent is being an aldehyde and comprising about 1% to about 15% of the medium, and the medium, when the cellular sample is placed thereinto, stabilizing the cellular sample sufficiently to allow separate morphological and quantitative analyses.

37. (Currently Amended) A cell ~~or tissue~~ collection medium, allowing morphological analysis and quantitation of RNA, DNA, or proteins in a cellular sample ~~both cytological and molecular methods of analysis of cells or tissues collected therein, wherein the molecular method of analysis comprises either RNA or DNA or protein analysis or the analysis of both RNA and DNA, and wherein~~ the medium is being water based and comprises comprising an alcohol, a cross-linking agent and an anti-degradation agent, ~~and wherein~~ the cross-linking agent is being an aldehyde and comprising about 1% to about 10% of the medium, and the medium, when the cellular sample is placed thereinto, stabilizing the cellular sample sufficiently to allow separate morphological and quantitative analyses.

38. (Previously Amended) The medium of claim 36 or 37, wherein the cross-linking agent comprises about 1% to about 5% of the medium.

39. (Previously Amended) The medium of claim 36 or 37, wherein the medium consists of a volume of less than 10 ml.

40. (Previously Amended) The medium of claim 36 or 37, wherein the medium consists of a volume of less than about 5 ml.

41. (Previously Amended) The medium of claim 36 or 37, where in the medium consists of a volume of less than about 2 ml.
42. (Previously Amended) The medium of claim 36 or 37 wherein the medium comprises a buffer component, at least one alcohol component, a cross-linking agent and an agent to inhibit degradation of at least one of the group consisting of RNA, DNA, and protein.
43. (Previously Amended) The medium of claim 42, wherein the buffer component has a buffering capacity within a pH range of about 2.5 to about 6.
44. (Previously Amended) The medium of claim 43, wherein the buffer component has a buffering capacity within a pH range of about 3 to about 5.
45. (Previously Amended) The medium of claim 44, wherein the buffer component has a buffering capacity within a pH range of about 3.5 to about 4.5.
46. (Previously Amended) The medium of claim 42, wherein the alcohol component comprises a C₁ to C₁₀ alcohol.
47. (Previously Amended) The medium of claim 46, wherein the alcohol component is selected from the group consisting of methanol, ethanol, propanols, butanols, and pentanols.
48. (Previously Amended) The medium of claim 47, wherein the alcohol component comprises ethanol or n-butanol.
49. (Previously Amended) The medium of claim 42, wherein the cross-linking agent is selected from the group consisting of formaldehyde and glutaraldehyde.
50. (Previously Amended) The medium of claim 49, wherein the cross-linking agent comprises glutaraldehyde-bisulfite.
51. (Previously Amended) The medium of claim 42, wherein the agent to inhibit degradation of at least one of the group consisting of RNA, DNA, and protein comprises at least one agent selected from the group consisting of a nuclease inhibitor, a protease inhibitor and a chelating agent.
52. (Previously Amended) The medium of claim 51, wherein the agent to inhibit degradation of at least one of the group consisting of RNA, DNA, and protein comprises a chelating agent.

53. (Previously Amended) The medium of claim 52, wherein the chelating agent is selected from the group consisting of murexide, chromotropic acid, 1-(1-hydroxy-2-naphthylazo-2-hydroxy-5-nitronaphthalene-4-sulphonic acid, EDTA (ethylenediaminetetraacetic acid), *o*-phenanthroline, and thiourea.

54. (Previously Amended) The medium of claim 53, wherein the chelating agent comprises ethylenediaminetetraacetic acid.

55. (Currently Amended) A method of performing morphological and biochemical analysis on a cellular sample~~cell or tissue~~, wherein the method comprises:

obtaining a preserved cellular sample~~cell or tissue~~, wherein the preserved cellular sample~~cell or tissue~~ is in a water-based medium comprising an alcohol, a cross-linking agent and an anti-degradation agent, ~~and wherein~~ the cross-linking agent ~~is being~~ an aldehyde ~~and~~ comprising about 1% to about 15% of the medium;

directly analyzing the morphology of the cellular sample~~cell or tissue~~ preserved in the medium; and

directly analyzing RNA or DNA or protein contained in the cellular sample~~cell or tissue~~ preserved in the medium, by lysing and quantitating the RNA, DNA, or protein.

56. (Currently Amended) A method of performing morphological and biochemical analysis on a cellular sample~~cell or tissue~~, wherein the method comprises:

obtaining a preserved cellular sample~~cell or tissue~~, wherein the preserved cellular sample~~cell or tissue~~ is in a water-based medium comprising a preservative, a cross-linking agent and an anti-degradation agent, ~~and wherein~~ the cross-linking agent ~~is being~~ an aldehyde ~~and~~ comprising about 1% to about 10% of the medium;

directly analyzing the morphology of the cell or tissue cellular sample preserved in the medium; and

directly analyzing RNA or DNA or protein contained in the cell or tissue cellular sample preserved in the medium, by lysing and quantitating the RNA, DNA, or protein.

57. (Previously Amended) The method of claim 55 or 56, wherein the cross-linking agent comprises about 1% to about 5% of the medium.

58. (Currently Amended) A collection medium, allowing morphological analysis and quantitation of RNA, DNA or proteins in a cellular sample, comprising water, an alcohol, a buffer, a cross-linking agent and an anti-degradation agent selected from the group consisting

of: an RNA anti-degradation agent, a DNA anti-degradation agent, and a protein anti-degradation agent, wherein the cross-linking agent is being an aldehyde and comprising about 1% to about 15% of the medium, and the medium, when the cellular sample is placed thereinto, stabilizing the cellular sample sufficiently to allow separate morphological and quantitative analyses.

59. (Currently Amended) A collection medium, allowing morphological analysis and quantitation of RNA, DNA or proteins in a cellular sample, comprising water, a preserving agent, a buffer, a cross-linking agent and an anti-degradation agent selected from the group consisting of RNA anti-degradation agent, DNA anti-degradation agent, and protein anti-degradation agent, wherein the cross-linking agent is being an aldehyde and comprising about 1% to about 10% of the medium, and the medium, when the cellular sample is placed thereinto, stabilizing the cellular sample sufficiently to allow separate morphological and quantitative analyses.

60. (Previously Amended) The medium of claim 58 or 59, wherein the cross-linking agent is selected from the group consisting of formaldehyde and glutaraldehyde.

61. (Previously Amended) The medium of claim 58 or 59, wherein the cross-linking agent comprises about 1% to about 5% of the medium.

62. (Currently Amended) An article of manufacture for preserving a ~~cell~~ cellular sample comprising a container containing the medium according to claim 58 or 59 and a lid fitting said the container.

63. (Previously Amended) The article of manufacture of claim 62, wherein the volume of the medium is less than 2 ml.

64. (Previously Amended) The article of manufacture of claim 63, further comprising a cell collecting device having an elongated member wherein a distal end of the elongated member has a non-absorbent increased surface area.

65. (Previously Amended) The article of manufacture of claim 64, wherein the distal end of the elongated member is a brush.

66. (Previously Amended) The article of manufacture according to claim 62, wherein the article of manufacture contains a mammalian cell.

67. (Previously Amended) The article of claim 62, wherein the cross-linking agent is selected from the group consisting of formaldehyde and glutaraldehyde.

68. (Currently amended) A method of ~~cell~~ cellular sample collection that allows detection of cell morphology and quantitative analysis of at least one of the group consisting of RNA, DNA, protein, and carbohydrate from a single sample, ~~said~~ the method comprising

obtaining preserved cells ~~or tissues~~ from a patient, wherein the preserved cells ~~or~~ ~~tissue~~ are in the medium according to claim 58 or 59;

removing an aliquot of cells from the medium for cell morphology analysis; and

removing an aliquot of cells from the medium for a quantitative analysis selected from the group consisting of DNA analysis, RNA analysis, protein analysis and carbohydrate analysis.

69. (Previously Amended) The method of claim 68, wherein the quantitative analysis is selected from the group consisting of DNA analysis and RNA analysis.

70. (Previously Amended) The method of claim 68, wherein the cells are stored in a sample of less than 10 ml.

71. (Previously Amended) The method of claim 68, wherein the cells are stored in a sample of less than about 5 ml.

72. (Previously Amended) The method of claim 68, wherein the cells are stored in a sample of less than about 2 ml.

73. (Previously Amended) The method of claim 68, wherein the cross-linking agent is selected from the group consisting of formaldehyde and glutaraldehyde.

74. (Previously Amended) The method of claim 68, wherein the cross-linking agent comprises about 1% to about 5% of the medium.

75. (new) A cell collection medium, allowing morphological analysis and quantitation of RNA, DNA or proteins in a cellular sample, the medium being water-based and comprising an alcohol, a cross-linking agent and an anti-degradation agent, the cross-linking agent being an aldehyde selected from the group consisting of a formaldehyde and glutaraldehyde, and comprising about 1% to about 15% of the medium, and the medium, when the cellular sample is placed thereinto, stabilizing the cellular sample sufficiently to allow separate morphological and quantitative analyses.